

Title (en)  
SLIDING COMPONENT

Title (de)  
GLEITKOMPONENTE

Title (fr)  
COMPOSANT DE COULISSEMENT

Publication  
**EP 4119807 A1 20230118 (EN)**

Application  
**EP 21767086 A 20210302**

Priority  
• JP 2021007813 W 20210302  
• JP 2020040352 A 20200309

Abstract (en)

Provided is a sliding component capable of reliably generating a negative pressure in a shallow groove regardless of a relative rotation speed of the other sliding component. In an annular sliding component 10 disposed at a relatively rotating position of a rotating machine and sliding relative to the other sliding component 20, a sliding surface 11 of the sliding component 10 is provided with a shallow groove 9 extending in a circumferential direction and generating a negative pressure and a deep groove 15 collecting a sealing target fluid F in the shallow groove 9 and deeper than the shallow groove 9, and the shallow groove 9 has a terminating end portion 9b in which a cross-sectional area of a flow path thereof becomes narrow toward the deep groove 15.

IPC 8 full level

**F16C 17/04** (2006.01); **F16J 15/34** (2006.01)

CPC (source: EP KR US)

**F16C 17/04** (2013.01 - KR); **F16C 17/045** (2013.01 - EP); **F16C 32/0633** (2013.01 - EP); **F16C 33/741** (2013.01 - EP); **F16J 15/34** (2013.01 - KR);  
**F16J 15/3412** (2013.01 - EP); **F16J 15/3416** (2013.01 - EP US); **F16C 17/047** (2013.01 - EP)

Designated contracting state (EPC)

AL AT BE BG CH CY CZ DE DK EE ES FI FR GB GR HR HU IE IS IT LI LT LU LV MC MK MT NL NO PL PT RO RS SE SI SK SM TR

Designated extension state (EPC)  
BA ME

Designated validation state (EPC)  
KH MA MD TN

DOCDB simple family (publication)

**EP 4119807 A1 20230118; EP 4119807 A4 20240424;** CN 115210488 A 20221018; JP WO2021182168 A1 20210916;  
KR 20220139957 A 20221017; US 2023118633 A1 20230420; WO 2021182168 A1 20210916

DOCDB simple family (application)

**EP 21767086 A 20210302;** CN 202180017508 A 20210302; JP 2021007813 W 20210302; JP 2022505934 A 20210302;  
KR 20227031184 A 20210302; US 202117908515 A 20210302